What is claimed is

1. An optical inspection system comprising:

a) a beam splitter having at least a first, second and third ports;

b) a source of illumination connected to a first port of the beam splitter;

c) a camera connected to a second port of the beam splitter;

d) an inspection area facing the third port of the beam splitter;

e) a light trap connected to the beam splitter, the light trap having an angled surface and a cavity.

2. The optical inspection system of claim 1 wherein the light trap comprises a cylinder with a conical member disposed therein

3. The optical inspection system of claim 2 wherein the conical member has a parabolic outer surface.

4. The optical inspection system of claim 1 wherein the light trap has an aperture positioned to receive light in a first direction and the angled surface is angled to reflect light from the first direction into the cavity.

5. The optical inspection system of claim 1 wherein the angled surface is made of light absorbing material.

6. The optical inspection system of claim 1 wherein the cavity is bounded by walls and the walls of the cavity are made of light absorbing material.

7. The optical inspection system of claim 1 wherein the cavity has interior walls and the interior walls of the cavity and the angled surface are made of anodized aluminum.

8. The optical inspection system of claim 1 wherein the angled surface is made of a reflective material and is positioned to reflect light into the cavity, and wherein the cavity is bounded by walls made of light absorptive material.

9. The optical inspection system of claim 1 wherein the light trap comprises a plurality of angled surfaces and a plurality of cavities.

10. An optical inspection system comprising:

a) a source of illumination emitting light in a first direction;

b) a mirror having a reflective surface positioned at an angle transverse to the first direction;

c) an inspection area illuminated by light reflected from the mirror;

d) a camera facing the inspection area; and

e) a means for absorbing extraneous light from the source of illumination passing through the mirror, said means positioned on a side of the mirror opposite the source of illumination.

11. The optical inspection system of claim 10 wherein the means for absorbing extraneous light comprises a surface angled to reflect extraneous into a cavity.

12. The optical inspection system of claim 11 wherein the cavity is bounded by walls and the walls are made of light absorptive material.

13. The optical inspection system of claim 11 wherein the means for absorbing extraneous light comprises a surface having a plurality of projections formed thereon, each projection have a surface angled with respect to the direction of travel of extraneous light passing through the mirror.

14. The optical inspection system of claim 11 wherein the means for absorbing extraneous light includes a cone.

15. The optical inspection system of claim 14 wherein the cone has an outer surface made of light absorbing material.

16. The optical inspection system of claim 10 wherein the means for absorbing light comprises a conical structure having an opening therein.

17. The optical inspection system of claim 10 wherein the means for absorbing extraneous light comprises a reflective surface reflecting extraneous light away from the mirror.

18. The optical inspection system of claim 10 additionally comprising a computer connected to the camera.